

Listing and Amendments to the Claims

This listing of claims will replace all previous versions and listings of claims in this application:

1.(currently amended) A Hybrid Controller (HC) for an IEEE 802.11 wireless data communications system-100 supporting quality of service (QoS) enhancements, comprising:

 a Station Management Entity (SME)-202 within the HC; and

 a Media Access Control (MAC) SubLayer Management Entity (MLME)-204 within the HC and communicably coupled both to the SME-202 and to MLMEs-204 for wireless stations (WSTAs)-106, 109 participating in the IEEE 802.11 wireless data communications system-100,

 wherein responsive to a schedule change for one of the participating WSTAs,-106,-109 the SME-202 within the HC generates a request primitive for transmission to the MLME-204 within the HC.

2.(currently amended) The HC according to claim 1, wherein the request primitive ~~contains~~ includes an address for the one of the participating WSTAs-106, 109 and a Schedule Element.

3.(currently amended) The HC according to claim 1, wherein the SME-202 transmits the request primitive to the MLME-204 within the HC.

4.(currently amended) The HC according to claim 3, wherein, responsive to receiving the request primitive from the SME-202, the MLME-204 formulates a Schedule QoS Action frame ~~containing~~ including the Schedule Element and transmits the formulated Schedule QoS Action frame

5.(currently amended) A wireless data communications system-100 including the HC according to claim 1, the wireless data communications system-100 further comprising:

 a MLME-204 within the one of the participating WSTAs-106, 109,

 wherein the MLME-204 within the one of the participating WSTAs-106, 109, responsive to receipt of the Schedule QoS Action frame by the one of the participating WSTAs-106, 109, generates an indication primitive for transmission to an SME-202 within the one of the participating WSTAs-106, 109.

6.(currently amended) The wireless data communications system-100 according to claim 5, wherein the indication primitive includes the Schedule Element.

7.(currently amended) A Hybrid Controller (HC) for an IEEE 802.11 wireless data communications system-100 supporting quality of service (QoS) enhancements, comprising:

a Station Management Entity (SME)-202 within the HC; and

a Media Access Control (MAC) SubLayer Management Entity (MLME)-204 within-10 the HC and communicably coupled both to the SME-202 and to MLMEs-201 for wireless stations (WSTAs)-106,-109 participating in the IEEE 802.11 wireless data communications system-100,

wherein, responsive to a request primitive relating to a schedule change for one of the participating WSTAs-106,-109, the MLME-201 within the HC determines a result for the request primitive and generates a confirm primitive for transmission to the SME-202 within the HC.

8. (Original) The HC according to claim 7, wherein the confirm primitive includes a result code corresponding to the result for the request primitive.

9.(currently amended) The HC according to claim 8, wherein the MLME-204 within the HC transmits the confirm primitive to the SME-202 within the HC.

10.-12. (Cancelled)

13.(currently amended) A method-300 of supporting quality of service (QoS) enhancements within a Hybrid Controller (HC) for an IEEE 802.11 wireless data communications system-100, comprising:

operating a Station Management Entity (SME)-202 within the HC;

operating a Media Access Control (MAC) SubLayer Management Entity (MLME)-204 within the HC and communicably coupled both to the SME-202 and to MLMEs-204 for wireless stations (WSTAs)-106, 109 participating in the IEEE 802.11 wireless data communications system-100; and

responsive to a schedule change for one of the participating WSTAs-106, 109, generating a request primitive for transmission from the SME-202 within the HC to the MLME-204 within the HC.

14.(currently amended) The method-300 according to claim 13, wherein the request primitive ~~contains~~ includes an address for the one of the participating WSTAs-106, 109 and a Schedule Element.

15.(currently amended) The method-300 according to claim 14, further comprising:
transmitting the request primitive from the SME-202 to the MLME-204 within the HC.

16.(currently amended) The method-300 according to claim 15, further comprising:
responsive to receiving the request primitive from the SME-202, formulating a Schedule QoS Action frame ~~containing~~ including the Schedule Element; and
transmitting the formulated Schedule QoS Action frame.

17.(currently amended) The method-300, 306 according to claim 16, further comprising:
responsive to receipt of the Schedule QoS Action frame by the one of the participating WSTAs-106, 109, generating an indication primitive for transmission to an SME-202 within the one of the participating WSTAs-106, 109.

18.(currently amended) The method-300, 306 according to claim 17, wherein the indication primitive includes the Schedule Element.

19.(currently amended) A method ~~306~~ of supporting quality of service (QoS) enhancements for a Hybrid Controller (HC) within an IEEE 802.11 wireless data communications system~~100~~, comprising:

operating a Station Management Entity (SME)~~202~~ within the HC;

operating a Media Access Control (MAC) SubLayer Management Entity (MLME)~~204~~ within the HC and communicably coupled both to the SME~~202~~ and to MLMEs~~204~~ for wireless stations (WSTAs)~~106, 109~~ participating in the IEEE 802.11 wireless data communications system~~100~~; and

responsive to a request primitive relating to a schedule change for one of the participating WSTAs~~106, 109~~, determining a result for the request primitive and generating a confirm primitive for transmission from the MLME ~~204~~ within the HC to the SME ~~202~~ within the HC.

20.(currently amended) The method ~~306~~ according to claim 19, wherein the confirm primitive includes a result code corresponding to the result for the request primitive.

21.(currently amended) The method ~~306~~ according to claim 20, further comprising:
transmitting the confirm primitive from the MLME ~~204~~ within the HC to the SME ~~202~~ within the HC.

22. -24. (Cancelled).

25.(new) A wireless station (WSTA) for an IEEE 802.11 wireless data communications system supporting quality of service (QoS) enhancements, comprising:

a Station Management Entity (SME) within the WSTA; and

a Media Access Control (MAC) SubLayer Management Entity (MLME) within the WSTA and communicably coupled both to the SME and to MLMEs for other wireless stations participating in the IEEE 802.11 wireless data communications system,

wherein, responsive to receipt of a Schedule QoS Action frame at the WSTA, the MLME within the WSTA generates an indication primitive for transmission to the SME within the WSTA.

26.(new) The WSTA according to claim 25, wherein the indication primitive includes a Schedule Element from the Schedule QoS Action frame.

27.(new) The WSTA according to claim 26, wherein the MLME within the WSTA transmits the indication primitive to the SME within the WSTA.